



STATE OF RHODE ISLAND AND PROVIDENCE PLANTATIONS

Department of Environmental Management  
DIVISION OF SITE REMEDIATION  
291 Promenade Street  
Providence, R.I. 02908-5767

8 November 1996

Mr. Philip Otis, P.E., Remedial Project Manager  
US Department of the Navy, Northern Division  
Code 18, Mail Stop #82  
10 Industrial Highway  
Lester, PA 19113-2090

RE: Allen Harbor Dredging

Dear Mr. Otis;

The Rhode Island Department of Environmental Management (RIDEM) Office of Waste Management has reviewed the information submitted regarding the chemical nature and grain size analysis for the dredge material at the entrance to Allen Harbor. Based on our review of this data RIDEM finds the material to be acceptable for use as part of the remediation of Allen Harbor Landfill. In particular, the material would be suitable for the creation of wetlands and for use as borrow, bedding material, and barrier protection layer in the relatively flat areas of the landfill. Please be advised, however, that use of this material on the steep slopes of the landfill will require further investigation due to the make up of the dredge material.

There could be geotechnical considerations which the Navy may wish to further investigate prior to the utilization of this material on the 3:1 slopes of the landfill. These considerations arise from the high percentage of fines in this material which range from 30 to 44%. Fines are defined as that material which passes a #200 sieve. When there is a high percentage of fines in a soil sample there could be concerns of sloughing should the material become saturated. The Navy is therefore encouraged to examine this aspect prior to utilizing this material on the 3:1 slopes of the landfill. One of many possible options for use of this material on the steep slopes is to mix the dredge with course gravel.

Please note that while this Office is encouraging the reuse of the dredge material for the remediation of Allen Harbor Landfill, the Navy is ultimately responsible for the selection and quantity of materials to be utilized in the remediation of any of its sites. If you have any questions or require additional information please call me at (401) 277-3872 ext. 7138.

Sincerely,

A handwritten signature in black ink, appearing to read 'Richard Gottlieb', with a long, sweeping horizontal stroke extending to the right.

Richard Gottlieb, P.E.  
Principal Sanitary Engineer

cc: W. Angell, DEM OWM  
M. Guirguis, DEM OWM  
D. Chopy, DEM OWR  
C. Williams, EPA Region 1  
H. Cohen, RIEDC  
M. Cohen, ToNK